

This group overcame staffing complexities
on the road to open access.

IMPLEMENTING
**Open-Access
Scheduling**
IN AN ACADEMIC PRACTICE

Jeffrey R. Steinbauer, MD, Karla Korell, BS,
Jennifer Erdin, BBA, and Stephen J. Spann, MD, MBA

The way we used to handle scheduling at Baylor Family Medicine matched the prevailing practice in health care: We maintained a large backlog of future appointments. Patients learned to expect a six- to eight-week wait for appointments and duelled with our office staff to be seen for acute care when needed. We developed complex systems for managing the demand for acute care, most of which didn't work very well.

We knew we needed a better way to schedule our patients and found a solution in open-access scheduling, also called "same-day" or "advanced-access" scheduling, which theoretically eliminates the appointment backlog and makes appointments available the same day the patient calls. The principle behind open-access scheduling is to "do today's work today."

As an academic practice, we encountered some unique obstacles on the road to open access. This article explains

how we overcame them. Much of what we learned can be applied to any family medicine practice.

Before open access

Baylor Family Medicine is an academic practice affiliated with the Department of Family and Community Medicine at Baylor College of Medicine in Houston. Our staff includes 10 part-time faculty, two nurse practitioners and four resident physicians. These 16 providers constitute approximately a six full-time-equivalent (FTE) practice.

In 1999, the Department of Family and Community Medicine joined the Idealized Design of Clinical Office Practice (IDCOP) program run by the Institute for Healthcare Improvement. Many novel concepts were introduced and promoted during the IDCOP process. One was open-access scheduling. ➤

Monthly visits to our clinic have increased 20 percent since we implemented open-access scheduling.

■ Baylor Family Medicine, a 16-provider academic practice in Houston, fought an appointment backlog for years.

■ Scheduling strategies such as assigning one provider to handle only acute-care appointments and reserving acute-care appointments in each provider's schedule failed to reduce the backlog.

■ In 2003, the practice began exploring whether open-access scheduling, which involves "doing today's work today," could solve its appointment backlog.

At the time, our appointment availability was about what you would expect from a group like ours. We diligently tracked our backlog by measuring the time until the third available appointment for a brief visit and found that it varied from one provider to another in a range from 10 to 25 days. Some providers had backlogs longer than 60 days. The average backlog was remarkably stable.

We had employed various improvement strategies:

- Assigning a provider to handle only acute-care appointments;
- Reserving acute-care appointments in each provider's schedule;
- Limiting appointment types;
- Analyzing the number of acute-care requests received daily and adjusting schedules to meet the demand.

These efforts were, at best, marginally successful. If a patient called one day and the acute-care appointments were all filled, then the receptionist would either hunt for someone to accept the patient anyway or tell the patient to call back the next morning for an appointment the next day. The receptionist could not book acute-care appointments for the next day because those appointments were not made available on the computer until the day they were to be used. This was, of course,

About the Authors

Dr. Steinbauer is the medical director of the Baylor College of Medicine in Houston. Karla Korell is the clinical operations manager for the Baylor College of Medicine's Department of Family and Community Medicine. Jennifer Erdin is a data analyst for Baylor Family Medicine. Dr. Spann is professor and chair of the Department of Family and Community Medicine at the Baylor College of Medicine. Conflicts of interest: none reported. The authors thank Richard Wender, MD, chair of the Department of Family Medicine at Jefferson Medical College in Philadelphia, and George Valko, MD, vice chair and medical director of the Jefferson University Family Medicine Practice, for their assistance.

frustrating to patients and staff alike, and the number of calls required to make an appointment continued to grow. We received many complaints about this scheduling system, and our telephones were chronically congested with frustrated patients making their second, third or fourth calls for an appointment. We came to believe that open-access scheduling could reduce the number of calls to our clinic and, in turn, improve patient satisfaction. However, there were few examples of it working in an academic setting.

Academically challenged

According to our IDCOP mentors, implementing open-access appointments required that we:

- Establish "generic" appointment types – that is, limit the type of appointments;
- Know the extent of our appointment backlog;
- Reduce the backlog;
- Understand the demand for appointments in our clinic;
- Ensure that our supply of appointments would meet that demand.

In theory, an open-access scheduling system works best when there is one type of appointment, regardless of patient age, illness or need. Obviously, a 15-minute visit can present problems for patients who want a "complete physical." For this reason, we analyzed our demand for physicals and found that our physicians were performing about 100 per week. Then we analyzed the number of appointments and patients in our backlog, and estimated the time required to work down this number of appointments. Because all our physicians are part-time, and because having them take on extra sessions would require extra payment from the clinic for that time, we developed a plan to have the physicians see additional patients during each session. Discouragingly, the plan indicated that it would take up to 11 months to eliminate the backlog.

An even bigger challenge was matching

supply to demand given the day-to-day variance in physician availability that is inherent in academic practices like ours. Informal discussions with faculty-physicians in other academic practices confirmed our doubts about whether this could be done. While it seemed that open-access scheduling could work well in a private office where providers are present most of the time, we were daunted by the complexity of scheduling faculty who have multiple responsibilities in a way that provides adequate daily access for patients.

In April 2003, we visited the Department of Family and Community Medicine at Jefferson Medical College in Philadelphia. This department had successfully instituted open-access scheduling in their clinic and had a very creative approach to eliminating the backlog of appointments:

- They did not work down their backlog of appointments. Rather, they set a start date for open access and made no future appointments past that date.
- They implemented a patient education program and informed patients about the days their physician was scheduled to be in the clinic so that patients could choose whether to wait to see their physician or see another physician.

The Jefferson program increased provider productivity, reduced the number of missed or

canceled appointments, and decreased the time staff spent rescheduling appointments when a provider had to change his or her schedule.

A new approach

We were encouraged by the Jefferson experience and decided to proceed using some of their ideas and some of our own:

We set a “go live” date for open-access scheduling to eliminate the backlog.

Beginning June 1, 2003, no appointments were made for dates after Sept. 1, 2003. Patients needing follow-up after that date were asked to call and make an appointment when they were ready to be seen. We expected that by Sept. 1 the number of daily appointment requests would almost equal the number of available appointment slots.

We established a five-day appointment window.

We had heard that other practices found about 50 percent of patients were seen the same day that they called, 20 percent were seen the next day and the remainder were seen within the next three days. By establishing our five-day window, we allowed patients to make appointments a few days in advance and not have to call back for same-day appointments.

We decided appointments for procedures would continue to be made in the

usual fashion. To facilitate this, we set aside extra time in the schedule for procedures.

We gave patients access

to the physicians’ clinic schedules. The information was made available through our phone system, in a printed handout and on our Web site. Patients could use this information to decide when to call for an appointment, when their usual provider would be in the clinic and whether they would need to see another physician.

We maintained existing staffing levels.

In the event that we were flooded with appointment requests beyond our capacity during the first few weeks of open-access scheduling, we arranged for a faculty physician to handle

■ Baylor Family Medicine’s decision was complicated because there were few examples of open-access scheduling working in an academic setting, where provider availability can change significantly from day to day.

■ The doctors at Baylor Family Medicine also doubted that they could eliminate their backlog, a required step in most open-access implementations.

■ The Baylor group was eventually convinced after a visit to Jefferson Medical College, where open access had been implemented without working down the backlog of appointments.

SUGGESTED READING

“Answers to Your Questions About Same-Day Scheduling.” Murray M. *FPM*. 2005;12:59-64.

“Waiting for Healthcare: Physician Offices Can Dramatically Reduce How Long Patients Wait for Appointments.” Murray M. *Postgraduate Medicine*. 2003;113:13-14.

“Same-Day Appointments: Exploding the Access Paradigm.” Murray M, Tantau C. *FPM*. 2000;7:45-50.

“Implementing ‘Open Access’ to Primary Care in a Hospital-Based Academic Practice.” Heffernan JJ, Parker RA, O’Neill S, Greenberg D. *Journal of General Internal Medicine*. 2000;15(Suppl 1):231.

“Redefining Open Access to Primary Care.” Murray M, Tantau C. *Managed Care Quarterly*. 1999;7:45-55.

“Must Patients Wait?” Murray M, Tantau C. *Joint Commission Journal on Quality Improvement*. 1998;24:423-425.

the overflow. We also expanded existing financial incentives for faculty physicians to provide the maximum of paid time in the clinic through make-up sessions if they were gone from the clinic longer than the expected period. By sharing additional earnings with physicians, we were able to increase physician time in the clinic. In addition, minimum expectations for time in the clinic and attendance were established for providers. Both of these initiatives helped increase provider availability and productivity.

We established “rules” for provider leave. These rules, listed below, helped ensure that the clinic’s appointment backlog did not build while providers were away and that providers did not have to return to a built-in backlog of patient appointments.

1. When a provider is away from the clinic, his or her schedule is blocked for the week of his or her return.

2. Three days before his or her return, half of the appointment slots are opened on his or her first day back in the clinic.

3. Two days before his or her return, half of the slots are opened on his or her second day back.

4. One day before his or her return, all of the slots are opened as usual.

We developed a system for reminding patients of necessary appointments. In some cases, it’s sufficient to tell a patient to “call for follow-up in four months,” for example. But for those follow-up appointments that are critical for monitoring chronic disease, we set up a system to remind the patient when it’s time to be seen. Our system automatically sends reminders to our telephone staff to call patients when their follow-up appointments are due.

We reengineered our scheduling pro-

cess for complete physical exams. The 100 complete physical exams our physicians were performing each week were scheduled under our old system as long visits. As a result, these visits often filled each physician’s schedule and forced the nurse practitioners to see most of our acute-care patients.

For our new system, we developed a plan for performing complete physical examinations in two visits. At the first visit, a nurse practitioner did a complete history and physical that focused on age-appropriate risk assessment. Routine laboratory tests were ordered at this visit. The patient returned in one to two weeks for a short visit with his or her physician who would then review the results of the laboratory tests, discuss the patient’s risk factors for disease and answer the patient’s questions. This workflow freed more appointments (100 short visits per week) for the physician and shifted more acute-care visits from the nurse practitioners to the physicians. Some patients did not like the system, mostly because it required a second co-payment. Most patients, however, accepted the new approach and indicated that they liked it better.

We developed a daily activity report. We believe data management is a crucial component of open-access scheduling. This daily report is used to review our daily performance and to monitor appointments over the upcoming five days.

After open access

After switching to open-access scheduling, the period for the third available appointment changed from an average of 17 days to 1 day. We have been able to maintain this average for more than 2.5 years despite unexpected fac-

■ Baylor Family Medicine’s first move after committing to open access was setting a date beyond which no appointments were made.

■ To help patients, the academic practice did two things that aren’t typically part of an open-access switch; it created a five-day appointment window and provided patients with access to its physicians’ schedules.

■ Rules for provider leave were established to prevent the appointment backlog from building while providers were gone.

VARIATIONS IN PROVIDER AVAILABILITY

The total number of available appointment slots during a typical week at Baylor Family Medicine can vary from day to day based on the number of available providers and their schedules.

	Monday	Tuesday	Wednesday	Thursday	Friday
Faculty	220	194	142	165	120
Residents	0	39	61	26	52
Total	220	233	203	191	172

While some days are extensively pre-booked, overall we have avoided a backlog.

ulty leave and the usual variations in provider availability that are inherent to an academic practice. While some days are extensively pre-booked, overall we have avoided a backlog.

Our daily tracking reports have revealed other outcomes. For example, we know that the number of available providers and their schedules continue to vary from day to day (see “Variations in provider availability” on page 62). We have made efforts to equally distribute the FTE throughout the week, but competing demands among faculty physicians for other academic responsibilities has prohibited complete leveling of the schedule. Despite these variations in daily appointment availability, the system has worked.

We have also kept an eye on our levels of pre-booked appointments. A higher percentage of visits are booked on Fridays, in part because of the limited availability of providers on this day. Overall, an average of about 70 percent of slots are booked at the beginning of that day. This percentage is higher than has been recommended by others. Our target is 50 percent. We believe that the extended absences of several providers have been a factor in our higher-than-expected percentage of pre-booked slots.

A surprising outcome concerned the number of telephone calls we receive. We expected our daily call volume to decrease because of a reduction in repeat calls from patients trying to make an appointment. The call volume actually increased by 33 percent. More than half of this increase could be attributed to an increased number of patients being seen for appointments. Interestingly, the percentage of calls answered “live,” rather than being queued for voice mail, increased, even though telephone staffing did not change. The telephone staff was able to handle this greater volume of calls because their conversations with patients were shorter. We believe this is because they had less difficulty identifying suitable appointment times. The telephone staff also spent less time rescheduling patients when the faculty physicians had to change their clinic schedule.

Monthly visits to our clinic have increased

20 percent since we implemented open-access scheduling. We have been able to accommodate this increase in visits without adding staff. Surprisingly, our no-show rate has not changed significantly. Most practices that have implemented open-access scheduling have reduced their no-show rates to near zero. Our no-show rate has remained at 8 percent, and we have found no correlation with the day the appointment is made (same day vs. previous day), the type of appointment (short vs. long), the status of the patient (new vs. established) or the appointment time (morning vs. afternoon).

Another problem in clinic scheduling for academic physicians is that their schedules change frequently because of meetings, teaching duties and other competing activities. We have tracked this phenomenon by recording the number of patients whose appointments had to be rescheduled because of changes in the provider’s schedule. When clinic schedules are maintained weeks or months in advance – which they must be when patients must wait weeks for an appointment – the probability increases that schedule changes will require that patients’ appointments be rescheduled. Because of open-access scheduling, we have had a 36-percent reduction in rescheduling of patient appointments, which has obvious benefits for our patients and our staff.

Patient satisfaction with the new system is high, according to our surveys. Written comments indicated that patients were pleased when they were able to make an appointment with their provider within a few days rather than having to wait several weeks. The concern with open-access scheduling that patients mentioned most often was not being able to schedule an appointment weeks in advance. These patients listed having chronic illnesses or busy personal schedules as the reason for their concern.

To accommodate those patients who wanted to make appointments more than five days in advance, we increased the appointment

■ Another twist Baylor Family Medicine put on the open-access model was to perform complete physical exams in two visits.

■ The two-visit physical exam policy freed more physician appointments and shifted more acute-care visits from nurse practitioners to physicians.

■ As a result of its new open-access policies, Baylor Family Medicine’s period until the third available appointment dropped from an average of 17 days to 1 day.

■ The practice put an emphasis on educating patients about the new system, and surveys done after the switch indicated patients were pleased.

Surprisingly, our no-show rate has not changed significantly.

■ The practice had three open-access surprises: call volume increased, no-show rates stayed the same and many providers were lukewarm toward the new system.

■ After nearly three years, the benefits of open access for Baylor Family Medicine's academic practice have outweighed the challenges.

window from five days to 15 days. Since this increase, we have monitored the scheduling system for any signs of an accumulating backlog. To date, this has not happened.

We also surveyed our providers and staff about their satisfaction with the new scheduling system. Surprisingly, most were either neutral in their thoughts on open access or thought it worked better than the old system but needed some improvement. We had expected that our providers and staff would be more pleased with the new system. They were concerned about the complaints patients had with regard to the short, five-day window in which to make appointments and about the continued no-show rate.

Conclusions

Open-access scheduling has served our academic practice well for nearly three years. One key to our success was careful education of patients, providers and staff. Another has been the use of daily reports to anticipate times of provider shortfall. We've continued using faculty physicians to cover clinic responsibilities during these times and haven't had to make substantial changes in our providers' clinic schedules.

Overall, our experience shows that open-access scheduling can be implemented in a traditional academic environment with benefits for everyone involved. **FPM**

Send comments to fpmedit@aafp.org.



Depression.

You can recognize it. You can diagnose it.
Managing it is a different story.

“Avoiding Pitfalls in Diagnosing and Managing Major Depression” is an AAFP online CME activity.

To learn more about it, visit
www.aafp.org/cases.xml



American Academy
of Family Physicians

